

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/082,863	02/26/2002	Jerzy Muszynski	CMC-12492-1	7010
	7590 07/31/2002			
ROBERT V. VICKERS			EXAMINER	
VICKERS, D. Suite 2000	ANIELS & YOUNG		LAM, THANH	HANH
50 Public Square Cleveland, OH 44113-2235			ANTINO	
			ART UNIT	PAPER NUMBER
			2834	
			DATE MAILED: 07/31/2002	

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No. 10/082,863 Applicant(s)

Muszynski

Examiner

Thanh Lam

Art Unit 2834

The MAILING DATE of this communication appears on the cover sheet with the correspondence address					
Period for Reply A SHOPTENED STATISTORY DEDICES FOR REPLY IS SET TO EXPIDE 1.2 A MONTHYS) FROM					
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.					
- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, mey e reply be timely filed after SIX (6) MONTHS from the					
mailing date of this communication If the period for reply specified above is less than thirty (30) deys, a reply within the statutory minimum of thirty (30) days will be considered timely.					
 If NO period for reply is specified ebove, the maximum stetutory period will epply a Feilure to reply within the set or extended period for reply will, by stetute, ceuse the 	he epplication to become ABANDONED (35 U.S.C. § 133).				
 Any reply received by the Office later then three months after the meiling date of the earned patent term edjustment. See 37 CFR 1.704(b). 	his communication, even if timely filed, mey reduce any				
Status					
1) Responsive to communication(s) filed on					
2a) ☐ This action is FINAL . 2b) ☑ This act	ion is non-final.				
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11; 453 O.G. 213.					
Disposition of Claims					
4) 💢 Claim(s) <u>30-52</u>	is/are pending in the application.				
	is/are withdrawn from consideration.				
5) Claim(s)	is/are allowed.				
6) 💢 Claim(s) 30-52					
7)					
	are subject to restriction and/or election requirement.				
Application Papers					
9) 🔀 The specification is objected to by the Examiner.					
10) The drawing(s) filed on Feb 26, 2002 is/are a) accepted or b) objected to by the Examiner.					
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).					
11)☐ The proposed drawing correction filed on is: a)☐ approved b)☐ disapproved by the Examin					
If approved, corrected drawings are required in reply to this Office action.					
12) The oath or declaration is objected to by the Examiner.					
Priority under 35 U.S.C. §§ 119 and 120					
13) Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).					
a) ☐ All b) ☐ Some* c) ☐ None of:					
1. Certified copies of the priority documents have been received.					
2. Certified copies of the priority documents have been received in Application No.					
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).					
*See the attached detailed Office action for a list of the					
14) Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).					
a) The translation of the foreign language provisional application has been received.					
15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.					
Attachment(s)					
1) Notice of References Cited (PTO-892)	4) Interview Summary (PTO-413) Paper No(s).				
2) Notice of Dreftsperson's Petent Drewing Review (PTO-948)	5) Notice of Informel Patent Application (PTO-152)				
3) X Informetion Disclosure Stetement(s) (PTO-1449) Peper No(s). 3	6) Other:				

Application/Control Number: 10082863 Page 2

Art Unit: 2834

DETAILED ACTION

Drawings

1. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the "a pole cap at radially inner end of said leg is <u>removably</u> mounted on the leg " of claim 35 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112

2. Claim 35 is rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The specification and drawings (3-10) of the present invention fails to described fails a pole cap at radially inner end of said leg is <u>removably</u> mounted on the leg.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

i Lun Application/Control Number: 10082863 Page 3

Art Unit: 2834

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 30-32, 37-47, and 49-52 are rejected under 35 U.S.C. 102(b) as being anticipated by Schultz et al.

Regarding claim 30, Schultz et al. disclose a multiple piece motor stator having a plurality of individual stator windings for mounting on an electric motor having a rotor mounted for rotation about a longitudinal axis within an outlying (9) stator core, each stator winding comprising: a base having a leg with longitudinally spaced front and rear ends, radially outer and inner ends, and first and second circumferentially opposite sides (pole structure 7); an electrical conductor coil (12) circling said base around said sides and said front and rear ends; and, mounting means on said base and said stator core for slidingly mounting said individual stator windings on said stator core.

Regarding claim 31, Schultz et al.disclose said mounting means on said base is spaced radially outwardly from said radially inner end of said leg.

Regarding claim 32, Schultz et al.disclose said mounting means on said base includes a connection portion on said radially outer end of said leg having radially spaced outer and inner ends and longitudinally spaced first and second ends, said connection portion being adapted to slidingly engage a corresponding slot in said stator.

Application/Control Number: 10082863 Page 4

Art Unit: 2834

Regarding claim 36, Schultz et al.disclose said mounting means on said base includes a connection portion on said radially outer end of said leg having radially spaced outer and inner ends and longitudinally spaced first and second ends, said connection portion being adapted to slidingly engage a corresponding slot is said stator.

Regarding claim 37, Schultz et al.disclose said connection portion includes a circumferential protrusion with circumferentially opposite sides spaced radially outwardly from said radially inner end of said connection portion, at least one of said circumferentially opposite sides of said protrusion extending circumferentially outwardly beyond one of said first and second circumferentially opposite sides of said leg.

Regarding claim 38, Schultz et al.disclose said connection portion is circumferentially wider at one of said longitudinally spaced first and second ends than at the other of said ends with a tapered longitudinal profile therebetween.

Regarding claim 39, Schultz et al.disclose said connection portion is circumferentially wider at one of said longitudinally spaced first and second ends than at the other of said ends.

Regarding claim 40, Schultz et al. disclose said connection portion has a trapezoidal profile in cross section.

Regarding claim 41, Schultz et al.disclose said connection portion has a T-shaped profile in cross section.

Regarding claim 42, Schultz et al.disclose said connection portion has a Y-shaped profile in cross section.

Art Unit: 2834

Regarding claim 43, Schultz et al.disclose said mounting means includes a connection portion on said base having a cross sectional profile and a slot in said stator core having a cross sectional profile corresponding with said cross sectional profile of said connection portion.

Regarding claim 44, Schultz et al.disclose said connection portion is spaced radially outwardly from said radially inner end of said leg.

Regarding claim 45, Schultz et al. disclose said mounting means includes a connection portion on said leg and a longitudinally extending slot in said stator core adapted to slidingly receive said connection portion, said connection portion and said slot including interengaging abutment surfaces adapted to prevent radial disengagement of said stator winding from said stator core.

Regarding claim 46, Schultz et al.disclose a multiple piece motor stator having a plurality of individual stator windings for mounting on an electric machine having a rotor mounted for rotation about a longitudinal axis within an outlying stator core, each stator winding comprising: a base including longitudinally spaced front and rear ends, a radially extending leg with radially outer and inner ends and circumferentially opposite sides, and a cross member spaced radially outwardly from said radially inner end of said leg (pole structure 7); an electrical conductor (12) encircling said leg around said sides and said front and rear ends; and, mounting means (9) on said stator core and said base for slidingly mounting said individual stator windings on said stator.

Art Unit: 2834

Regarding claim 47, Schultz et al.disclose said mounting means includes a longitudinally extending slot in said stator core adapted to slidingly receive said cross member.

Regarding claim 49, Schultz et al.disclose said pole cap further includes a flange extending from said leg in circumferentially opposite directions.

Regarding claim 50, Schultz et al.disclose said cross member has longitudinally spaced first and second ends.

Regarding claim 51, Schultz et al.disclose said cross member is circumferentially wider at one of said first and second ends of said cross member than at the other said end.

Regarding claim 52, Schultz et al.disclose said cross member has a longitudinally tapered profile between said first and second ends of said cross member.

Claim Rejections - 35 USC § 103

- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 6. Claims 33-35, and 48 rejected under 35 U.S.C. 103(a) as being unpatentable over Schultz et al.in view of Prior art (fig. 2 of the application).

Application/Control Number: 10082863

Art Unit: 2834

Schult et al. disclose every aspect of the claimed invention except a pole cap at said

radially inner end of said leg is removably mounted on the leg.

Prior art discloses a pole cap (12) at radially inner end of said leg is removably mounted

on the leg.

It would have been obvious to one of ordinary skill in the art at the time the invention was

made to modify the pole structure of Schult et al. to fix the pole cap as taught by Prior art in order

to provide the stator pole with ease to assembly.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner

should be directed to Thanh Lam whose telephone number is (703) 308-7626. The fax phone

number for this Group is (703) 305-3432.

Any inquiry of a general nature or relating to the status of this application or proceeding

should be directed to the Group receptionist whose telephone number is (703) 308-0656.

Thanh Lam

Patent Examiner

July 26,2002

Page 7